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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/802,294	03/17/2004	Gotz Kullik	71227	3610
23872	7590	01/25/2005	EXAMINER	
MCGLEW & TUTTLE, PC 1 SCARBOROUGH STATION PLAZA SCARBOROUGH, NY 10510-0827			WEISS JR, JOSEPH FRANCIS	
			ART UNIT	PAPER NUMBER

3743

DATE MAILED: 01/25/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

10/802,294

Applicant(s)

KULLIK ET AL.

Examiner

Joseph F. Weiss, Jr.

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 17 March 2004.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-21 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-21 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date 03/17/04.
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_.

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## DETAILED ACTION

### *Claim Rejections - 35 USC § 103*

1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1-4, 5-12 & 14-18 are rejected under 35 U.S.C. 103(a) as being unpatentable over Kolarovic in view of Richey, II et al. (6805122).

In regards to claim 1 & 10, Kolarovic discloses an incubator for premature and newborn patients with a heater and an oxygen metering device for delivering a fresh air flow into an interior space of the incubator (col. 3 line 29 to col. 4 line 31), to include an oxygen sensor (58) a fresh air feed system (30) and an oxygen source (col. 4 lines 45-50) but does not disclose the specific arrangement of its respiratory support as comprising an electrically operated oxygen concentrator. However, Richey discloses such (oxygen concentrator being the sieve beds). The references are analogous since they are from the same field of endeavor, the respiratory/medical arts. At the time the instant application's invention was made, it would have been obvious to one of ordinary skill in the art to have taken the features of Richey and used them with the device of Kolarovic. The suggestion/motivation for doing so would have been because Kolarovic discloses that several options exist for the oxygen source to include oxygen cells, which one of ordinary skill in the art appreciates that sieve beds are an interchangeable equivalent for

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the production of oxygen (See Harral et al US 5199423 col. 6 line 62-col. 7 line 12).

Therefore it would have been obvious to combine the references to obtain the instant application's claimed invention.

In regards to claims 2 & 11, the suggested device discloses that said oxygen concentrator is a material comprising one of a pressure varying absorber based on zeolite. (See Richey disclosure regarding the sieve beds)

In regards to claims 3 & 12, the suggested device discloses the use of oxygen cells (See Kolarovic as noted previously) wherein said oxygen concentrator is a material comprising one of a pressure varying absorber based on a plurality of solid electrolyte cells (note Richey uses multiple sieve beds), which bring about a local oxygen enrichment because of a potential difference applied to said solid electrolyte cells.

In regards to claims 5 & 14, the suggested device discloses the use of a fan, to provide fresh air flow into the incubator by said fan. (See Kolarovic ref # 50 & the airflow system 30).

In regards to claims 6 & 15, the suggested device discloses the use of a radial compressor to provide an airflow. (See figs 11 & 12 of Richey)

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In regards to claims 7 & 16, the suggested device discloses the use of a humidifier arranged in the fresh airflow, which is fed into the incubator introducing moisture in the incubator. See Kolarovic # 106)

In regards to claims 8 & 17, the suggested device discloses the connectivity of the oxygen sensor to the oxygen metering device via an oxygen controller (note fig 3 oxygen sensor 58 connected to micro-controller 64 connected to CPU 48 which is connected to the oxygen solenoid driver 104 of Kolarovic).

In regards to claims 9 & 18, the suggested device discloses the heater for the fresh airflow enriched with oxygen is controlled as a function of a temperature sensing means measuring the temperature in the interior space of the incubator. (note air temp sensor 54 of Kolarovic).

In regards to method claims 19-21, one of ordinary skill in the art would appreciate that the method steps claimed in the instant application would naturally flow from the device disclosed in the prior art as noted above and therefore are rejected herein above with respect to claims 1-3, 5-12 & 14-18.

2. Claims 4 & 13 are rejected under 35 U.S.C. 103(a) as being unpatentable over Kolarovic & Richey as applied to claim 4 above, and further in view of Kutt et al (US 6827760).

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In regards to claim 4, the suggested device discloses an oxygen sensor, but does not explicitly disclose the sensor as an electrochemical measuring cell. However, Kutt disclose such (col. 11, line 33). The references are analogous since they are from the same field of endeavor, the respiratory arts. At the time the instant application's invention was made, it would have been obvious to one of ordinary skill in the art to have taken the features of Kutt and used them with the suggested device. The suggestion/motivation for doing so would have been to because the suggested device discloses the need for an oxygen sensor & Kutt discloses an oxygen sensor for a ventilator. Therefore it would have been obvious to combine the references to obtain the instant application's claimed invention.

### ***Conclusion***

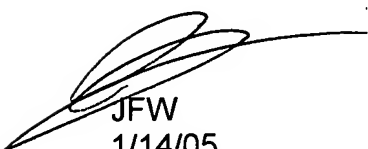
3. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. 6779523, 6691702, 6651658, 6629525, 6482637, 6406523, 6265210, 5957081, 5531807, 5199423

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Joseph F. Weiss, Jr. whose telephone number is (571) 272-4805. The examiner can normally be reached on Monday through Friday from 8 am until 4 pm.

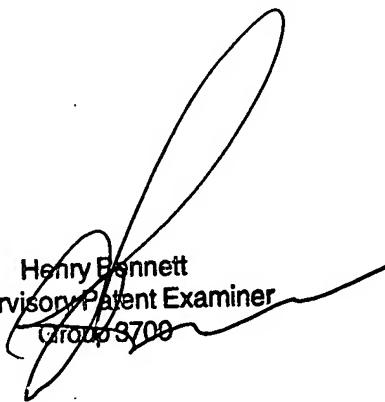
If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Henry A. Bennett can be reached on 571-272-4791. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



JFW  
1/14/05



Henry Bennett  
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